

# **Praktikum Bioinformatics**

## **'The Bioinformatics Lab'**

Dr. L. Kajan, Dr. M. Schmidberger

Monday, 14:00-16:00

Practical room MI 01.08.021

<http://rostlab.informatik.tu-muenchen.de/cms/biolab/>  
[https://rostlab.org/owiki/index.php/The\\_bioinformatics\\_lab](https://rostlab.org/owiki/index.php/The_bioinformatics_lab)

# Round of introduction

# Organization – present time

- 20 min: presentation about experiences in last programming challenge
  - one student, named at the end of the last session – volunteers wanted
  - 5 slides
  - his protocol will be published at the website
- 10 min: discussion / feedback about last programming challenge
- 30 min: argumentation for the new topic
  - one student leading the discussion, named at the beginning of the session – volunteers wanted
  - No slides
- 30 min: raising of critical issues in the new topic
  - one student leading the discussion, named at the beginning of the session – volunteers wanted
  - No slides
- 10 min: general discussion and outline of new programming challenge
- Rotation of USB devices

# Organization – outside present time

- Implement programming challenge
  - At the USE device there should be a working and documented solution
- Write a protocol
  - 2-4 pages
  - One for every session will be published at the website
- Prepare for the next topic
  - Useful links are provided at website

# Criteria to pass – at least ...

- One presentation of experiences + one published protocol
- One argumentation leader for the topic
- One discussion leader raising critical issues
- A Debian package with your favorite bioinformatic tool (last two sessions)

# Topics

- **External media / installing a Linux OS / Debian stable / Linux kernel**
- Shell scripts, command line (terminal) editors and compilation
- User management / directory services
- Mail
- Webserver
- Default web services
- Version control, diff, patching
- Connectivity: VPN, (V)LAN, firewall, IDS, networking, DNS
- RAID, file systems, network file systems
- Computer Clusters
- Creating modules, separating algorithm from interface
- Package a piece of software, create a Debian or RPM package